

AMENDMENTS TO THE CLAIMS

1. (Currently Amended) A communications apparatus comprising:
an encoder for encoding a signal;
a code compression unit, coupled to the encoder, for compressing the encoded signal using a lossless scheme and a lossy scheme; and
a memory, coupled to an output of the code compression unit, for storing the compressed encoded signal; and
wherein the code compression unit further comprises a demultiplexer, a lossless compression block and a lossy-compression block.
2. (Currently Amended) The apparatus of claim 1 further comprising:
a code decompression unit, coupled to the memory, for decompressing the stored signal using a lossless scheme and a lossy scheme; and
a decoder, coupled to the code decompression unit, for decoding the decompressed signal; and
wherein the code decompression unit further comprises a multiplexer, a lossless decompression block and a lossy-decompression block.
3. (Original) The apparatus of claim 2 wherein the quality of the signal decompressed using the lossy scheme is improved by changing weighting factors and a tilt factor in a post filter.
4. (Original) The apparatus of claim 1 wherein the lossless scheme is used to compress parameters of the encoded signal having high inter-frame redundancy.
5. (Original) The apparatus of claim 4 wherein the parameters of the encoded signal having high inter-frame redundancy includes coefficients of a long term filter and codebook gains.
6. (Original) The apparatus of claim 1 wherein the lossy scheme is used to compress some parameters of the encoded signal having low inter-frame redundancy.
7. (Original) The apparatus of claim 6 wherein the parameters of the encoded signal having low inter-frame redundancy that are compressed include fixed codebook indices.
8. (Original) The apparatus of claim 6 wherein the parameters of the encoded signal having low inter-frame redundancy that are not compressed include adaptive codebook indices.
9. (Original) The apparatus of claim 1 further comprising a switch that enables an encoded signal received by a receiver to be compressed by the code compression unit and stored in the memory.
10. (Original) The apparatus of claim 2 further comprising a switch that enables the stored signal to be decompressed by the decompression unit and output from a transceiver.
11. (Original) The apparatus of claim 1 further comprising an operator interface unit.

12. (Original) The apparatus of claim 1 wherein the apparatus is a mobile telephone or a communication device.

13. (Currently Amended) A method for compressing a signal comprising the steps of: converting the signal to a digital signal; encoding the digital signal; compressing, within a compression unit, the encoded signal using a lossless scheme and a lossy scheme; and storing the compressed encoded signal in a memory coupled to an output of the compression unit; and wherein the compression unit includes a demultiplexer, a lossless compression block and a lossy-compression block.

14. (Currently Amended) The method of claim 13 further comprising the steps of: decompressing, within a decompressing unit, the stored signal using a lossless scheme and a lossy scheme; decoding, within a decoder, the decompressed signal; and outputting the decoded signal; and wherein the decompression unit includes a multiplexer, a lossless decompression block and a lossy-decompression block.

15. (Original) The method of claim 14 wherein the quality of the signal decompressed using the lossy scheme is improved by changing weighting factors and a tilt factor in a post filter of the decoder.

16. (Original) The method of claim 13 wherein the lossless scheme is used to compress parameters of the encoded signal having high inter-frame redundancy.

17. (Original) The method of claim 16 wherein the parameters of the encoded signal having high inter-frame redundancy include coefficients of a long term filter and codebook gains.

18. (Original) The method of claim 13 wherein the lossy scheme is used to compress some parameters of the encoded signal having low inter-frame redundancy.

19. (Original) The method of claim 18 wherein the parameters of the encoded signal having low inter-frame redundancy that are compressed include fixed codebook indices.

20. (Original) The method of claim 18 wherein the parameters of the encoded signal having low inter-frame redundancy that are not compressed include adaptive codebook indices.

21-34 (Canceled)

35. (Currently Amended) A method for decompressing a signal comprising the steps of: decompressing, within a decompressing unit, a compressed encoded digital signal using a lossless scheme and a lossy scheme; decoding, within a decoder, the decompressed signal; and outputting the decoded signal; and

wherein the decompressing unit includes a multiplexer, a lossless decompression block and a lossy-decompression block.

36. (Original) The method of claim 35 wherein the quality of the decompressed signal is improved by changing weighting factors and a tilt factor in a post filter of the decoder.

37. (Currently Amended) The method of claim 35 further comprising the step of losslessly compressing parameters of an encoded digital signal, the parameters having high inter-frame redundancy.

38. (Original) The method of claim 37 wherein the parameters of the encoded digital signal having high inter-frame redundancy include coefficients of a long term filter and codebook gains.

39. (Original) The method of claim 35 further comprising the step of lossy compressing some parameters of an encoded digital signal, the parameters having low inter-frame redundancy.

40. (Original) The method of claim 39 wherein the parameters of the encoded signal having low inter-frame redundancy include fixed codebook indices.

41. (Original) The method of claim 39 wherein the parameters of the encoded signal having low inter-frame redundancy include adaptive codebook indices

42. (New) The apparatus of claim 1 wherein the demultiplexer demultiplexes parameters of the encoded signal into losslessly-compressed, lossy-compressed and uncompressed parameters.

43. (New) The apparatus of claim 42 wherein the losslessly-compressed parameters are output by the demultiplexer to the lossless compression block.

44. (New) The apparatus of claim 42 wherein the lossy-compressed parameters are output by the demultiplexer to the lossy-compression block.

45. (New) The method of claim 37 wherein the losslessly compressing parameters of the encoded digital signal are retrieved from a memory and decompressed by the lossless decompression block.

46. (New) The method of claim 39 wherein the lossy compressing parameters of the encoded digital signal are retrieved from a memory and decompressed by the lossy-decompression block.